To:	"Jeremy Gale" <jgale@google.com>
From:	"Franck Chastagnol" <franckc@google.com>
Cc:	"David King" [redacted]
Bcc:	
Received Date:	2007-02-15 02:29:40 GMT
Subject:	Re: [Eng-sbo] Audio fingerprinting technology

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hi jeremy,

my engineering team is handling fingerprinting.
at this point we have integrated with Audible Magic solution and are considering using
Google inhouse solution (a team at Google has developped audio fingerprinting).
so we are not actively looking at other third party technology.

but if you want to give us the name and contact info of your friend,
it is always good to know the players in this industry and in case we are not satisfied with
Audible or Google technology we will reach out to your friend.

thanks ,
franck

On 2/14/07, Jeremy Gale <jgale@google.com> wrote:
> Hi YouTube engineers,
>
> Sorry for the spam, but I couldn't find a more appropriate mailing list.
>
> I know an ex-coworker in Calgary, Canada who, with a partner, has
> developed an audio fingerprinting technology you may be interested in.
> There has been a lot of talk in the press about you guys developing a
> similar system. I have no idea how far along you are in your efforts,
> but I thought you might be interested in their technology.
>
> Advantages of their fingerprinting technology:
> - Small fingerprints, only 48 bits
> - Very fast to generate, no FFTs required
> - Fine-grained resolution, can use as little as 1 second of reference
> audio
> - Can work well with distortion such as different recordings from TV,
> camcorders, etc.
> - With such small fingerprints, the lookup can be easier. For example,
> Phillips' fingerprinting technology used by MySpace has 8096-bit
> fingerprints where 500 bits can be different. With theirs, sometimes
> only 2 bits are different, meaning you can just calculate all
> permutations and look them up directly.
> - The system is very flexible. You can tune many aspects of it for your
> needs.
>
> Their system is actually deployed in 5+ countries around the world
> today. It is being used for TV ratings right now - they record 1000
> source channels and make a fingerprint of each of them for every 3
> seconds of audio. There are devices placed in 2500 homes recording the
> audio from the TV. It then looks up the fingerprints in the database
> to get extremely accurate information on what people are watching.

>
> I know the inventors would be more than happy to give a demo to
> YouTube. Let me know if you are interested in getting in touch with
> the them to find out more details or to bring them in for a demo.
>
> Thanks very much!
>
> Jeremy Gale
> [redacted]
> _____
> Eng-sbo mailing list
> [redacted]
> https://mailman.corp.google.com/mailman/listinfo/[redacted]
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